AMENDMENTS TO THE CLAIMS, COMPLETE LISTING OF CLAIMS IN ASCENDING ORDER WITH STATUS INDICATOR

Docket No.: NEL-0020

Please amend the following claims as indicated.

- 1. (Original) A method for detecting Venezuelan equine encephalitis virus ("VEE") using a genetically biotinylated single chain fragment variable antibody ("scFv Ab"), comprising:
- (a) reacting the genetically biotinylated scFv Ab with a sample containing VEE for observing antigen-binding activity; and
- (b) analyzing the reactant by a system consisting of an immunofiltration enzyme assay ("IFA") with a light addressable potentiometric sensor ("LAPS").
- 2. (Original) The method of claim 1, wherein said genetically biotinylated scFv Ab is a genetically streptavidin-binding peptide tagged recombinant biotinylated scFv Ab.
- 3. (Currently Amended) The method of claim 2, wherein said biotinylated scFv Ab displays high has streptavidin-binding activity.
 - 4. (Original) The method of claim 2, wherein said IFA assay comprises the steps of:
- (a) preparing an immunocomplex sandwich, said sandwich consisting of VEE, biotinylated antibody, fluoresceinated polyclonal antibody and streptavidin;
 - (b) capturing said sandwich by filtration on biotinylated membrane; and
 - (c) detecting said captured sandwich by anti-fluorescein urease conjugate.
- 5. (Currently Amended) The method of claim 4, wherein a concentration ratio of biotinylated antibody to fluoresceinated polyclonal antibody-of is 250:500 (ng/spot) provides the highest signal to noise ratio with fixed concentration of VEE.